

<p>89-110408/15      B05          NIPPON KAYAKU KK          *27.08.87-JP-211236 (03.03.89) A61k-09 B01j-13/02  <b>Liposome prepn. - by forming homogeneous water-in-oil emulsion composed of lipid and organic solvent and lyophilising the emulsion</b>          C89-048844</p>	<p><b>NIPK 27.08.87</b>          *JO 1056-136-A</p>	<p>B(1-D2, 4-B1B, 5-B1P, 12-M11F)</p>
		<p>(5pp dwg.No.0/0)</p>

Lyophilised liposome precursor (I) is prep'd. by forming homogeneous w/o type emulsion which is composed of lipid and organic solvent, sealing water soluble substrate and H<sub>2</sub>O; and lyophilisation of the emulsion. New liposome is prep'd. by dispersing precursor (I) in aq. medium.

USE/ADVANTAGE - Prepn. stages of liposome are few, and long period of storage is possible. High base content liposome can be obt'd.

In an example, 20 ml glass vial, dipalmitoyl phosphatidyl choline (58.7 mg), dioleylphosphatidyl choline (16.7 mg) and cholesterol (9.6 mg), were charged, next, diethyl ether (7.5 ml) was added. To this, carboxyfluorescein aq. soln. (10 mM tris-HCl buffer, pH = 7.5, 100 nmol/l; 2.5 l) was added and dispersed by bath type ultrasonic dispersion appts. to form w/o emulsion. The emulsion was lyophilised in dry ice acetone medium. Stable powdered liposome precursor was obt'd. To this, 10 mM tris-HCl buffer (pH 7.5; 6 ml) was added and the powder was dispersed by shaking, etc. Emulsion type liposome dispersion was obt'd. The ave. particle size of the liposome was 850 nm. Catching ratio of carboxymethylfluorescein was 14%.